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PTO/SB/08A (08-00)  
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| <b>Substitute for form 1449A/PTO</b><br><br><b>INFORMATION DISCLOSURE<br/>STATEMENT BY APPLICANT</b><br><br><i>(use as many sheets as necessary)</i> |   |                 |   | <b>Complete if Known</b> |  |
| Application Number   |   | Unassigned      |   |                          |  |
| Filing Date  |   | 14 October 2003 |   |                          |  |
| First Named Inventor   |   | Lai             |   |                          |  |
| Group Art Unit   |   | Unassigned      |   |                          |  |
| Examiner Name  |   | Unassigned      |   |                          |  |
| Attorney Docket Number   |   | RDRT 1004-2     |   |                          |  |
| Sheet  | 1 | of              | 2 |                          |  |

| U.S. PATENT DOCUMENTS |                          |                      |                                      |  |  |  |
|-----------------------|--------------------------|----------------------|--------------------------------------|--|--|--|
| Examiner<br>Initials* | Cite<br>No. <sup>1</sup> | U.S. Patent Document |                                      | Name of Patentee or Applicant<br>of Cited Document | Date of Publication of<br>Cited Document<br>MM-DD-YYYY | Pages, Columns, Lines,<br>Where Relevant<br>Passages or Relevant<br>Figures Appear |
|                       |                          | Number               | Kind Code <sup>2</sup><br>(if known) |  |  |  |
| DK                    | A1                       | 5,465,185            |                                      | Heim et al.  | 11-07-95   |  |
|                       | A2                       | 5,668,685            |                                      | Soeya et al.                                       | 09-16-97   |  |
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|                       | A14                      |                      |                                      |  |  |  |
|                       | A15                      |                      |                                      |  |  |  |
|                       | A16                      |                      |                                      |  |  |  |
|                       | A17                      |                      |                                      |  |  |  |
|                       | A18                      |                      |                                      |  |  |  |
|                       | A19                      |                      |                                      |  |  |  |
|                       | A20                      |                      |                                      |  |  |  |

| FOREIGN PATENT DOCUMENTS          |                          |                         |                     |                                      |  |  |  |                |
|-----------------------------------|--------------------------|-------------------------|---------------------|--------------------------------------|--|--|--|----------------|
| Examiner<br>Initials <sup>1</sup> | Cite<br>No. <sup>1</sup> | Foreign Patent Document |                     |                                      | Name of Patentee or<br>Applicant of Cited Document | Date of Publication of<br>Cited Document<br>MM-DD-YYYY | Pages, Columns, Lines,<br>Where Relevant<br>Passages or Relevant<br>Figures Appear | T <sup>6</sup> |
|                                   |                          | Office <sup>3</sup>     | Number <sup>4</sup> | Kind Code <sup>5</sup><br>(If known) |  |  |  |                |
|                                   | B1                       |                         |                     |                                      |  |  |  |                |
|                                   | B2                       |                         |                     |                                      |  |  |  |                |
|                                   | B3                       |                         |                     |                                      |  |  |  |                |
|                                   | B4                       |                         |                     |                                      |  |  |  |                |
|                                   | B5                       |                         |                     |                                      |  |  |  |                |
|                                   | B6                       |                         |                     |                                      |  |  |  |                |
|                                   | B7                       |                         |                     |                                      |  |  |  |                |
|                                   | B8                       |                         |                     |                                      |  |  |  |                |
|                                   | B9                       |                         |                     |                                      |  |  |  |                |
|                                   | B10                      |                         |                     |                                      |  |  |  |                |

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| Examiner<br>Signature<br> | Date<br>Considered<br>4/22/04 |
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<sup>1</sup> Unique citation designation number. <sup>2</sup> See attached Kinds of U.S. Patent Documents. <sup>3</sup> Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). <sup>4</sup> For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. <sup>5</sup> Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST. 16 if possible. <sup>6</sup> Applicant is to place a check mark here if English language Translation is attached.

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| <div style="float: left; width: 40%;"><p>Substitute for form 1449B/PTO</p><h2 style="text-align: center;">INFORMATION DISCLOSURE<br/>STATEMENT BY APPLICANT</h2><p style="text-align: center;">(use as many sheets as necessary)</p></div> <div style="float: right; width: 60%;"><table border="1" style="width: 100%; border-collapse: collapse;"><tr><th colspan="2" style="text-align: center;">Complete if Known</th></tr><tr><td style="width: 50%;">Application Number</td><td>Unassigned</td></tr><tr><td>Filing Date</td><td>14 October 2003</td></tr><tr><td>First Named Inventor</td><td>Lai</td></tr><tr><td>Group Art Unit</td><td>Unassigned</td></tr><tr><td>Examiner Name</td><td>Unassigned</td></tr><tr><td>Attorney Docket Number</td><td>RDRT 1004-2</td></tr></table></div> |                 |    |   | Complete if Known |  | Application Number | Unassigned | Filing Date | 14 October 2003 | First Named Inventor | Lai | Group Art Unit | Unassigned | Examiner Name | Unassigned | Attorney Docket Number | RDRT 1004-2 |
|--|-----------------|----|---|-------------------|--|--------------------|------------|-------------|-----------------|----------------------|-----|----------------|------------|---------------|------------|------------------------|-------------|
| Complete if Known  |                 |    |   |                   |  |                    |            |             |                 |                      |     |                |            |               |            |                        |             |
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| Attorney Docket Number   | RDRT 1004-2     |    |   |                   |  |                    |            |             |                 |                      |     |                |            |               |            |                        |             |
| Sheet  | 2               | of | 2 |                   |  |                    |            |             |                 |                      |     |                |            |               |            |                        |             |

| OTHER PRIOR ART – NON PATENT LITERATURE DOCUMENTS |                       |   |                |
|---|-----------------------|---|----------------|
| Examiner Initials*                                | Cite No. <sup>1</sup> | Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published. | T <sup>2</sup> |
|   | C1                    | P. Bruno et al., "Oscillatory Coupling Between Ferromagnetic Layers Separated by a Nonmagnetic Metal Spacer," Sept. 16, 1991, The American Physical Society, Physical Review Letters, Vol. 67, No. 12, pp. 1602-1605.   |                |
|   | C2                    | J. J. deVries et al., "Exponential Dependence of the Interlayer Exchange Coupling on the Spacer Thickness in MBE-grown Fe/SiFe/Fe Sandwiches," April 14, 1997, The American Physical Society, Physical Review Letters, Vol. 78, No. 15, pp. 3023-3026.          |                |
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|   | C4                    | Zhu-Pei Shi et al., "Antiferromagnetic Bias in the Interlayer Magnetic Coupling," May 20, 1994, Europhysics Letters, 26 (6), pp. 473-478.   |                |
|   | C5                    | Zhu-Pei Shi et al., "Interlayer Magnetic Coupling in Metallic Multilayer Structures," June 1, 1994, The American Physical Society, Physical Review B, Vol. 49, No. 1, pp. 15 159-15 178.  |                |
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